

ABSTRACT OF THE DISCLOSURE

A method for forming a non-volatile memory device, the method including forming an oxide-nitride-oxide (ONO) layer over a portion of a substrate, the ONO layer including a bottom oxide layer, a top oxide layer and a nitride layer intermediate the bottom and top oxide layers, and managing movement of at least one of electrons and holes from the substrate towards the ONO layer by controlling a thickness of at least one of the bottom oxide layer, the nitride layer and the top oxide layer, wherein the top oxide layer is at least 1.5 times thicker than the bottom oxide layer. Non-volatile memory devices constructed in accordance with methods of the invention are also described.